METHOD AND SYSTEM FOR MANAGING NETWORK TRAFFIC

ABSTRACT

A method for managing network traffic includes provisioning an internet protocol (IP) network for communicating traffic. The IP network comprises a plurality of nodes coupled by IP links. The method includes monitoring the IP

5 network for a congestion event and, upon detecting a congestion event, selecting a label switched path (LSP) of the IP network for reroute. The method includes computing a hybrid path route for the selected LSP between a first node and a second node of the plurality of nodes. The hybrid path route comprises at least one lightpath of a wavelength division multiplex (WDM) topology coupled to the IP network. The

10 method also includes determining whether performance of the hybrid path route for the selected LSP reduces costs and, if the hybrid path route reduces costs, activating a new IP link on each of the at least one lightpaths of the WDM topology and rerouting the selected LSP according to the hybrid path route.